Work done by the Industrial Chemist during 1109 and 1110.

13. *Mr. K. P. Nilakanta Pillai : With reference to the working of the Industrial Chemist, will the Government be pleased to state :

(*a*) the work or works in which he was engaged during 1109 M. E. and the results thereof ; and

(*b*) the programme of work awaiting him for 1110 M. E. ?

Mr. N. K. Padmanabha Pillai (*Director of Industries*) :

(*a*) A *statement of the work done in the Industrial Research Laboratory by the Industrial Chemist and the Chemical Assistant during 1109, is placed on the table. The nature of the work done in the Industrial Research Laboratory is such that in most cases, the Industrial Chemist and the Chemical Assistant have to attend to the same work and therefore it is not possible to separate their work and say which part was done by the Industrial Chemist and which by the Chemical Assistant. Except in those cases where such division can be easily shown, which is indicated in the appropriate places, the report of their joint work only can be given.

(*b*) The †programme of work for 1110 is placed on the table.

Work done by the Geological Assistant during 1109 and 1110.

14. *Mr. K. P. Nilakanta Pillai : With reference to the working of the Geological Assistant, will the Government be pleased to state :

(*a*) the work or works in which he was engaged during 1109 M. E. and the results thereof ; and

(*b*) the programme of work awaiting him for 1110 M. E. ?

Mr. N. K. Padmanabha Pillai : (*a*) & (*b*) The ‡information required is laid on the table.

Mr. M. N. Paramesvaran Pillai : May I know whether there is any programme of work for 1110 ?

Mr. N. K. Padmanabha Pillai : Yes, that is also laid on the table.

Work done by the Chemical Assistant during 1109 and 1110.

15. **Mr. K. P. Nilakanta Pillai :** With reference to the work of the Chemical Assistant, will the Government be pleased to state :

(*a*) the work or works in which he was engaged during 1109 M. E. and the results thereof ; and

(*b*) the programme of work awaiting him for 1110 M. E. ?

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* *Vide* Appendix IV A—page 33.
† *Vide* Appendix IV B—page 34
‡ *Vide* Appendix V A and V B—pages 35 and 36

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Appendix IV A.

Vide Answer to Question No. 13.

Work done by the Industrial Chemist and his Assistant during 1109.

The investigation of food materials was continued. Banana flour, sweet potato flour, Chana flour and arrow root flour were examined.

Some field experiments in the manufacture of salt with a view to improve the yield and quality of the salt produced were started in the Thamaracolam Old Allom. Sixteen pans were selected from a region which was a swamp. The pans were relaid, alkalities were made to prevent percolation of fresh water and in the mode of farming. By the end of the year salt was scraped. This salt on analysis was found to be of greater purity than that manufactured in the neighbouring pans, where the farming was carried according to the old methods. The Industrial Chemist also visited most of the alloms and was studying the conditions obtaining therein. The study has disclosed several defects which should be removed before the total output of the salt could be improved.

An examination of fifteen samples of paint was made for Mr. John Kurian who was given a report giving the directions in which improvements could be made. Samples of industrial water were investigated for Mr. V. T. Thanan of the Quilon Tanneries and Messrs A. D. Cotton Mills, Ltd., Quilon. Boiler feed water for Messrs. P. John and Sons and Aspinwall & Co., of Alleppey were also examined. In every case, methods for treating the water to render it fit for this purpose were given.

Samples of cocobrandy and jaggery arrack were investigated for the Excise Department.

A report was prepared and submitted to Government on the utility of cocoanut jaggery as a raw material for the manufacture of sugar.

484 samples of water, raw and filtered, were analysed for the Water Works Department. Besides these, during the final test of the filter plant, tes s were conducted on various samples of water, sediments, &c. 14 samples of aluminium sulphate also were analysed for the same d partment.

Eleven orders for Electroplating were received and duly executed Analysis of 59 samples of materials was also conducted. Answers were supplied asusual to the several enquiries received. The Industrial Chemist also supervised the work of the Dyer.

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The Industrial Chemist went on deputation to the All-Ceylon Cocoanut Exibition and Conference held in Colombo and he submitted a report on his arrival. He was also in charge of the duties of the Director of Industries from 19-11-1109 to 5-12-1109.

Appendix IV B.

Programme of work of the Industrial Chemist and his assistant 1110 M. E.

1. Investigation of salt manfacture :—

Experiments in the Alloms on the crystallisation of salt.

Efforts at improving the quality and quantity of the yield.

Laboratory work on the salt produced, the salt sent for examination, bitterns and brines.

Study of the conditions of manufacture of salt within several alloms in the State.

2. Analysis of arrack, both palmyrah jaggery arrack, and toddy arrack. Visit to the distilleries to examine the methods of distillation and devise measures for improvement. Detection of undesirable substances in samples manufactured in the distilleries.

3. Works for the Water Works Department ; Analysis of samples of water and also of the chemicals used in the refining of water.

4. Electroplating.

5. Work for the Boiler section ; analysis of the Boiler Feed water, boiler crust when required, examination of water softners.

6. Experiments to investigate the possibilities of the indigenous raw material.

7. General supervision of the Dyeing section of the department.

8. Touring in connection with the inspection of salt factories, and distilleries, enquiries concerning grant of loans.

9. As usual enquiries for information on industrial questions will be attended to and technical advice given when sought for.

10. Propagauda work by means of interviews, lectures, exhibitions and otherwise for furthering industrial activities.

11. Analysis of the samples of the many kinds of materials submitted.

In addition to the above, urgent questions that might call for investigation will be taken up as they present themselves.

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